

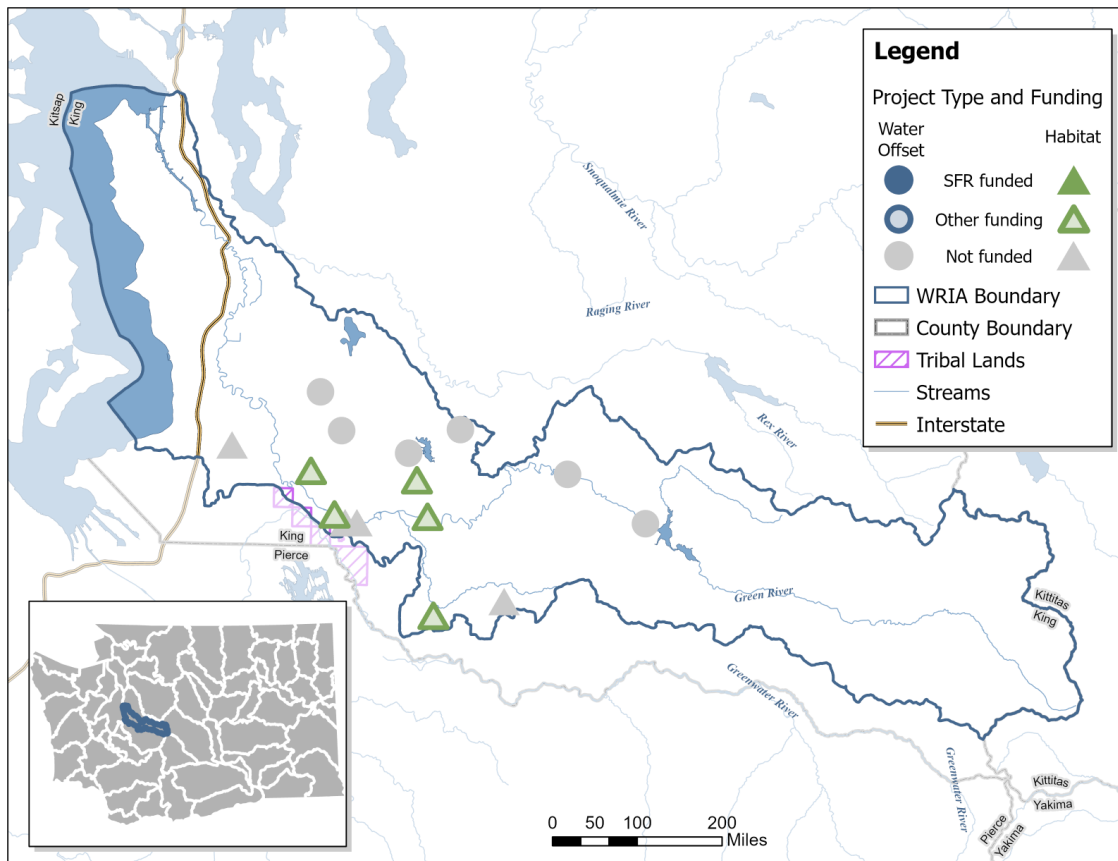
# Watershed Plan Implementation Assessment for the Duwamish-Green Watershed

The Washington Department of Ecology adopted the Duwamish-Green Watershed Restoration and Enhancement Plan on May 11, 2021, as a part of the Streamflow Restoration law (RCW 90.94.030). The Duwamish-Green Watershed is also known as Water Resource Inventory Area (WRIA) 9. Plan implementation is ongoing as local entities secure funding and develop their projects intended to offset the impacts on streamflows from new domestic permit-exempt (PE) wells and achieve a net ecological benefit (NEB).

Ecology assesses plan implementation periodically and conducts outreach to WRIA 9 partners and project sponsors to present information to the best of our ability. This assessment provides an update on:

- Local water offset and habitat projects (as defined in the watershed plan).
- Current and projected new domestic PE wells.
- Current estimated and projected consumptive water use impacts from these new wells.

## Projects in WRIA 9 (Duwamish-Green Watershed)

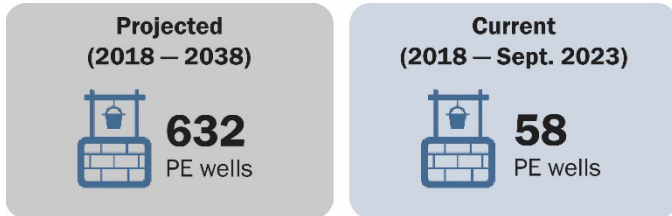


Approximate locations of water offset and habitat projects in WRIA 9 from the adopted plan. Projects contribute to the anticipated net ecological benefit and offset the impacts from new PE wells. Projects are funded through either Ecology’s Streamflow Restoration (SFR) grant or other funding sources. Basin-wide projects are not shown on the map.

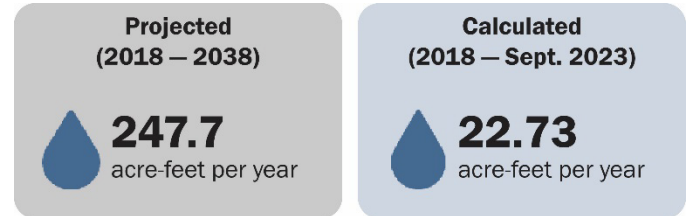
## Watershed plan implementation

Ecology is using the following parameters to track progress on plan implementation.

### Number of new PE wells installed

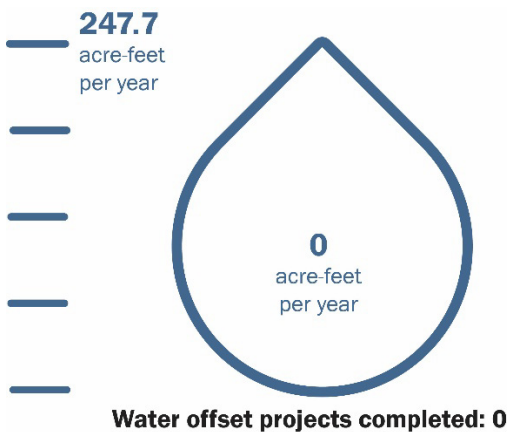


### Consumptive water use from PE wells



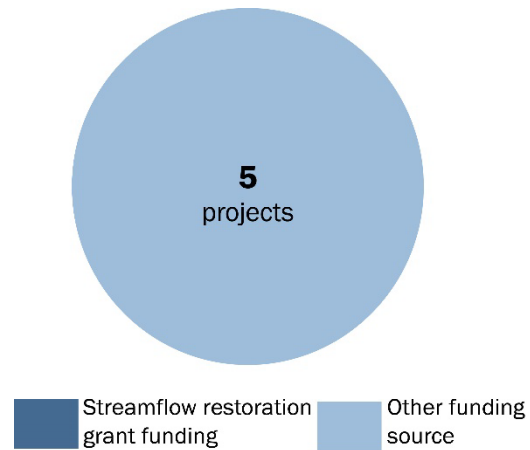
### Water offset achieved

No water offsets have yet been realized, because there are no water offset projects underway.



### Secured funding for projects

Projects have received funding from sources other than Ecology’s Streamflow Restoration grants.



## Implementation snapshot

- Installation of new PE wells in WRIA 9 (Duwamish-Green Watershed) is proceeding at a slower rate than the local watershed plan projected (67% below the projected rate). Using the plan’s assumption of consumptive water use per new PE well, Ecology estimates the consumptive water use impacts from these new wells is also 67% below the projected rate.
- King County, Washington State, and the federal government contributed over \$10 million towards five habitat projects including stream restoration, riparian restoration, and levee setback. No water offset projects identified in the plan have yet begun.
- Ecology received three applications seeking competitive streamflow restoration grant funding for projects in the Duwamish-Green watershed plan (one each in 2019, 2020, and 2022). One project earned sufficient scores to receive a funding offer. Washington Water Trust was awarded nearly \$1M to perform a Salish Sea Regional Managed Aquifer Recharge feasibility study in coordination with King County Department of Natural Resources and Parks.

## Watershed plan summary

The Duwamish-Green watershed planning committee met from October 2018 to February 2021 to develop a new watershed restoration and enhancement plan that:

- Projected 632 new PE wells from years 2018 to 2038.
- Estimated the impact of these wells on rivers and streams at 247.7 acre-feet per year.
- Identified 6 water offset<sup>1</sup> and 10 habitat projects to provide a [net ecological benefit](#) to streamflows.

Projected PE well growth and consumptive water use (years 2018 - 2038)



**688**  
PE wells



**247.7**  
acre-feet per year

Projected streamflow benefits from planned projects



**1,075**  
acre-feet per year

A volume of 247.7 acre-feet is equal to about 122 Olympic-sized swimming pools.

## Benefits of plan implementation



Initiates locally led solutions.



Improves rivers and streams for salmon.



Offsets consumptive water use from rural homes.

## Streamflow Restoration Law (RCW 90.94)

In January 2018, the Washington State Legislature passed the Streamflow Restoration law (RCW 90.94) to help restore streamflows to levels necessary to support robust, healthy, and sustainable salmon populations while providing water for new homes in rural Washington.

Ecology has been actively implementing this law since its passage. Ecology, in coordination with state and local agencies, Tribal governments, and non-profit organizations has funded, led, and supported a range of 15 diverse local watershed plans across the state. Ecology, with generous support from the Legislature has also implemented a competitive grant offering to help state and local agencies, tribal governments, and non-profit organizations implement projects in their local watershed plans required by this law.

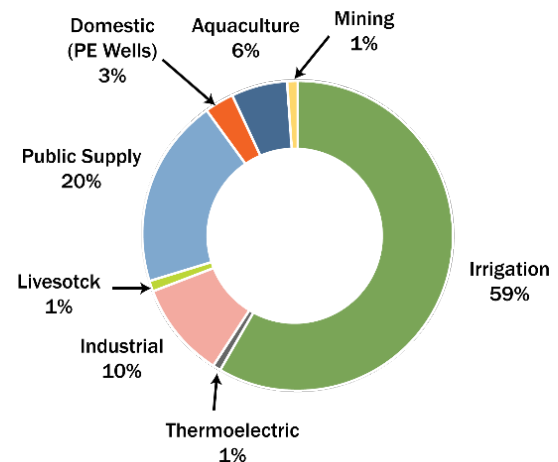
<sup>1</sup> From NEB Guidance (Publication number 19-11-079): Offset is the anticipated ability of a project or action to counterbalance some amount of the new consumptive water use over the next 20 years (2018 – 2038). Offsets need to continue beyond the 20-year period for as long as new well pumping continues.

## Consumptive water use in Washington State

Significant resources and collaboration went into statewide and local planning and ongoing local plan implementation to offset water use from domestic permit-exempt (private) wells in Washington State.

Consumptive water use from these wells accounts for about 3% of water use in Washington, a small portion compared with other consumptive water uses.

## Consumptive Water Use in Washington State (2015)



Data adapted from U.S. Geological Survey’s report on Water Use in Washington (2015).

## Webpages

- [Streamflow Restoration](http://ecology.wa.gov/StreamflowRestoration): ecology.wa.gov/StreamflowRestoration
- [Streamflow Restoration Grants](http://ecology.wa.gov/StreamflowGrants): ecology.wa.gov/StreamflowGrants

## Publications

- [Streamflow Restoration Competitive Grants Status](#): Publication number 22-11-026
- [Streamflow Restoration Planning Update](#): Publication number 21-11-015
- [WRIA 9 Watershed Restoration and Enhancement Plan](#): Publication number 21-11-009
- [Final Guidance for Determining Net Ecological Benefit](#): Publication number 19-11-079

Watershed partners and project sponsors can update Ecology on the status of watershed plan implementation by emailing [WRProjects@ecy.wa.gov](mailto:WRProjects@ecy.wa.gov).



Streamflow Restoration  
[WRProjects@ecy.wa.gov](mailto:WRProjects@ecy.wa.gov)  
360-688-8928



To request an ADA accommodation, contact Ecology by phone at 360-407-6831 or email at [WRPubs@ecy.wa.gov](mailto:WRPubs@ecy.wa.gov), or visit <https://ecology.wa.gov/accessibility>. For Relay Service or TTY call 711 or 877-833-6341